

THE NEED FOR ORDER  
IN THE U.S. HOP INDUSTRY  
JUSTIFICATION FOR THE PROPOSAL IN FAVOR OF A  
HOPS FEDERAL MARKETING ORDER

FALL 2002

**INTRODUCTION**

Hops are a perennial crop requiring substantial production inputs. The annual cost of production is approximately \$4,000 per acre, but the investment to enter the business is substantial. Hops require a specialized trellis system and harvesting equipment not suitable for any other crop. Today, American commercial hop production is limited to three states, Washington, Oregon, California and Idaho.

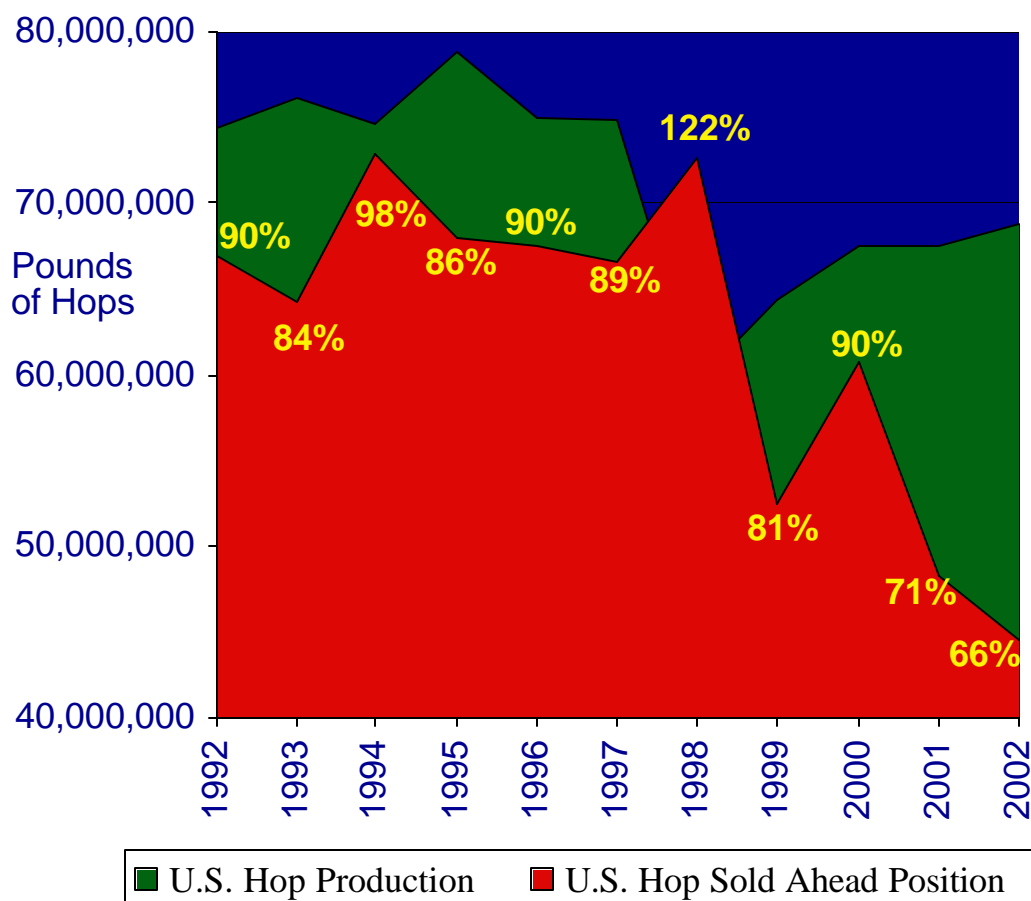
The hop and brewing industries have experienced tremendous technological breakthroughs in recent years. New technology at the hop processor and brewery level has improved utilization, resulting in a need for fewer hops to satisfy existing demand. New technology and more efficient varieties at the grower level have resulted in the conversion of substantial acreage to more efficient varieties, resulting in the need for fewer acres. With few alternative crops and incredibly high fixed costs associated with hop production, growers are unable to leave the hop industry without incurring a substantial loss. Low prices and eroding equity have left many growers unable to invest in new equipment. The result has been the steady erosion of farm equity brought about by over supply and the resulting poor prices. To further compound the problem, hop growers have no "exit strategy" if they wish to reduce acreage or leave the industry all together. There is simply no market for a hop farm or its equipment.

From 1966 until 1985, a Federal marketing order regulated the amount of hops that could be sold by growers, bringing it more in line with anticipated demand. During that time, grower numbers remained stable. Almost every year the marketing order was in place, the saleable was responsibly managed which resulted in fair market prices returned to growers. Growers did not get rich but they made a comfortable living, something that cannot be said of today's hop industry. Circumstances beyond growers' control led to the demise of the previous Federal marketing order. Since that time, as was the case before the last marketing order, wild swings in acreage and price have plagued the hop industry. The hop industry has undergone a traumatic 65 percent reduction in grower numbers in the 17 years since the last marketing order.

American hop growers understand that their problems developed over time and that their problems will not disappear over night. They recognize the need to remove a substantial percentage of current acreage from production as quickly as possible and in an orderly fashion. They know they need a permanent solution to their problems. They are willing to make substantial sacrifices to achieve the goal of a more orderly and profitable hop industry, but they cannot do it alone. A Federal marketing order will provide the marketing tool necessary to manage the flow of hops to the market.

### PROBLEM STATEMENT

*Problem 1:* Brewers have moved away from long-term contracts attracted to an abundance of lower-priced hops on the "spot" market. The movement toward the spot market has transferred the risk of selling the product to growers already burdened with growing risks. The hop industry has traditionally relied on multiple-year contracts to provide price stability through difficult times. Over supply guarantees that contracts are scarce. When future supply is guaranteed due to chronic oversupply, it is economical for the brewery to trade away some of the stability inherent in forward contracts to purchase its hops on the spot market where prices are often very low. This practice will likely continue until the over supply is either gone or not available for sale on the world market and it is in the brewers' financial interest to sign multiple year contracts again. The hop industry enters 2002 with approximately 65 percent of total hop production contracted as of March 1, the lowest percentage in history (typically 80 percent or more of the current crop year has been contracted by March 1). The graph below shows the March 1 sold ahead figures (adjusted in December of each year for actual production) for the past decade



The chart to the left shows the current sold ahead position relative to that of previous years. The percentage includes both alpha and aroma hops. Aroma hops are typically grown only when contracted and therefore skew the data to a more fully contracted position. It is safe to say that 95%+ of aroma hop production is contracted.

### *U.S. sold ahead position 2002 - 2007*

Crop Year	2002	2003	2004	2005	2006	2007
Pounds	44,491,407	32,666,807	19,687,823	15,107,081	2,033,794	650,261
% of Crop	66.57%	48.88%	29.46%	22.60%	3.04%	0.97%

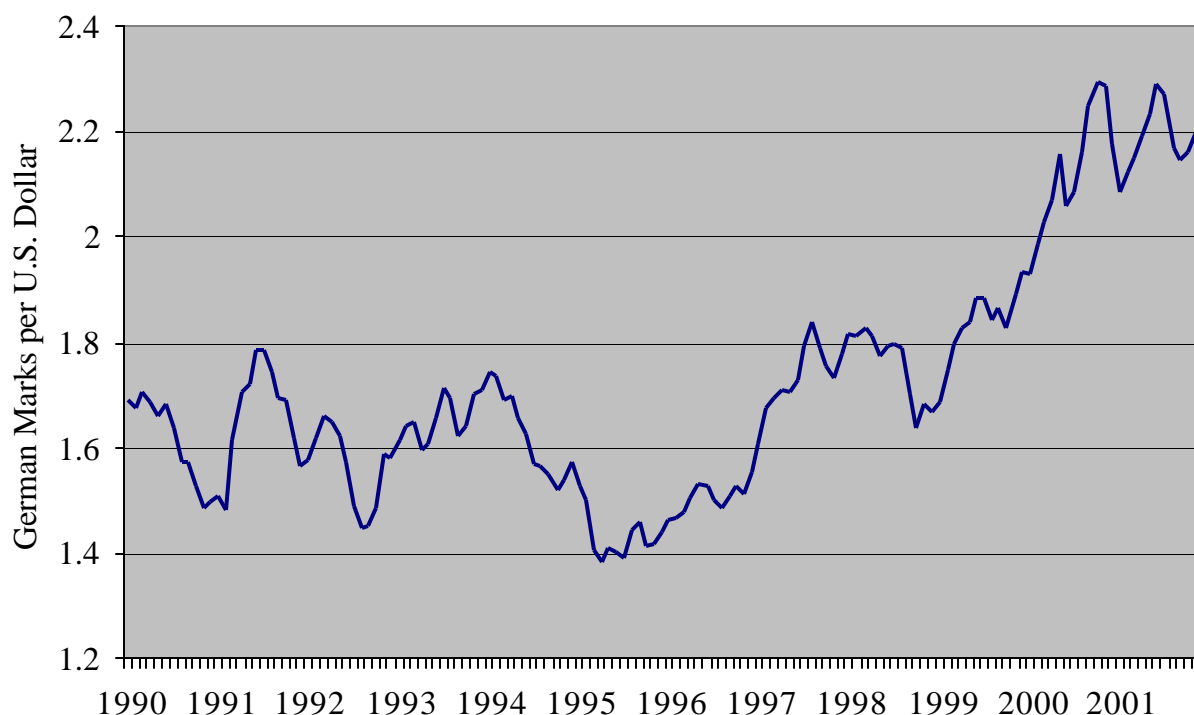
Source: USDA NASS. All sold ahead percentages use the 2001 crop final production figures to avoid speculation on future production volume.

In this table, note the absence of long-term forward contracts.

*Problem 2:* There is no structure currently in place to manage the quantity of hops produced or sold. Asset fixity and the few alternative crops available has been the stimulus for growers to continue producing hops despite poor prices in the hopes that economic recovery is right around the corner. There have not been any price spikes for over a decade and German crop failures, once fairly common (one in every three years or so) are also now a rarity.

*Problem 3:* The strong dollar places American growers at a competitive disadvantage making American hops relatively expensive on the world market. At present, the industry reduces acreage through attrition to compensate for the exchange rate inequities. After several years of losses, the banking community is skeptical and hesitant to finance hop growers. Increasing a farm's efficiency through new varieties or improved technology requires substantial investment. The strength of the dollar combined with the current market conditions brought on by over supply means there is little hope that a grower will receive a return on that investment.

DM / USD 1990 - 2001

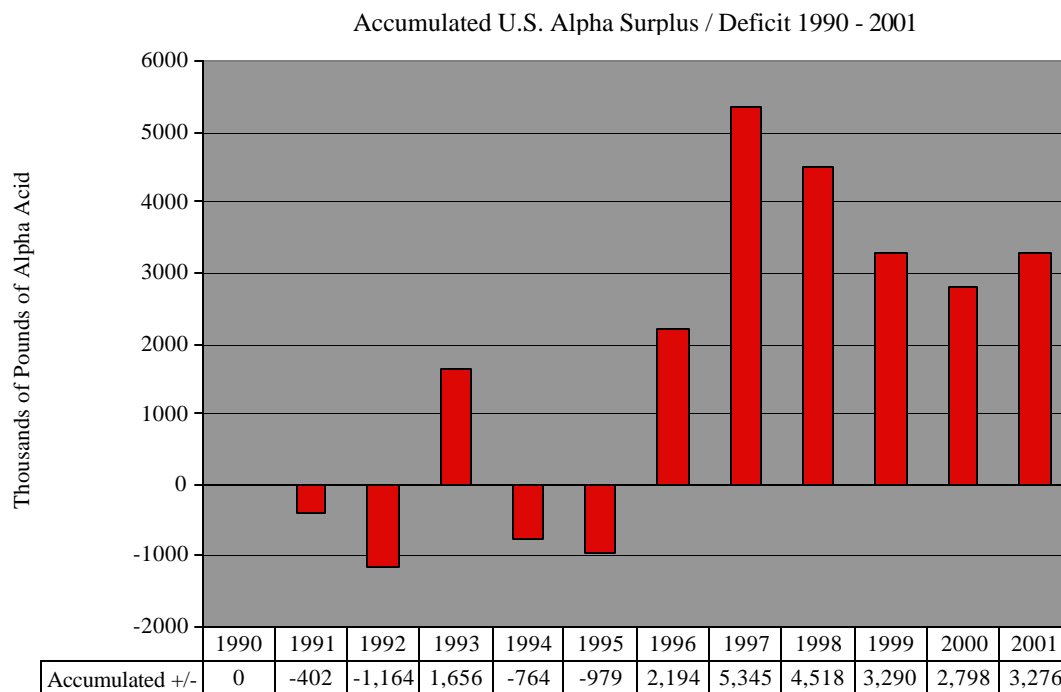


In the graph above, you can see the dramatic increase in the strength of the U.S. dollar versus the German mark over the past ten years.

The United States is the most efficient producer of alpha acid in the world and can in many cases produce over 50 percent more alpha acid per acre than the average German hop grower.

The costs of production in Germany and the United States are such that the DM:USD exchange rate should be between 1.6 and 1.8 DM/USD for the U.S. to be competitively priced on the world market while still providing a return to the grower.

*Problem 4:* In the past forward contracts guided the growers' planting decision. Through the Internet and e-mail, contacts worldwide routinely provide valuable information on market demand. Valuable information is regularly reported to growers and arguably growers today are more informed on market conditions than ever before. There is, however, no structure or authority to use this information to manage the marketing of the hops the industry as a whole produces.



The chart to the left shows an HGA estimate of the alpha acid inventory that has existed on the market for the past 10 years. Please note the reaction of the market to over or under supply instead of a stable and managed trend in any one direction.

### HYPOTHESIS

A Federal Marketing Order will allow growers to manage marketing through a base allotment system. The structure a Federal Marketing order offers will allow growers to manage the release of production into the world market thereby managing the negative effects of over production. The release of only that inventory necessary to satisfy estimated demand will result in a fair and stable market price for hops.

### OBJECTIVES

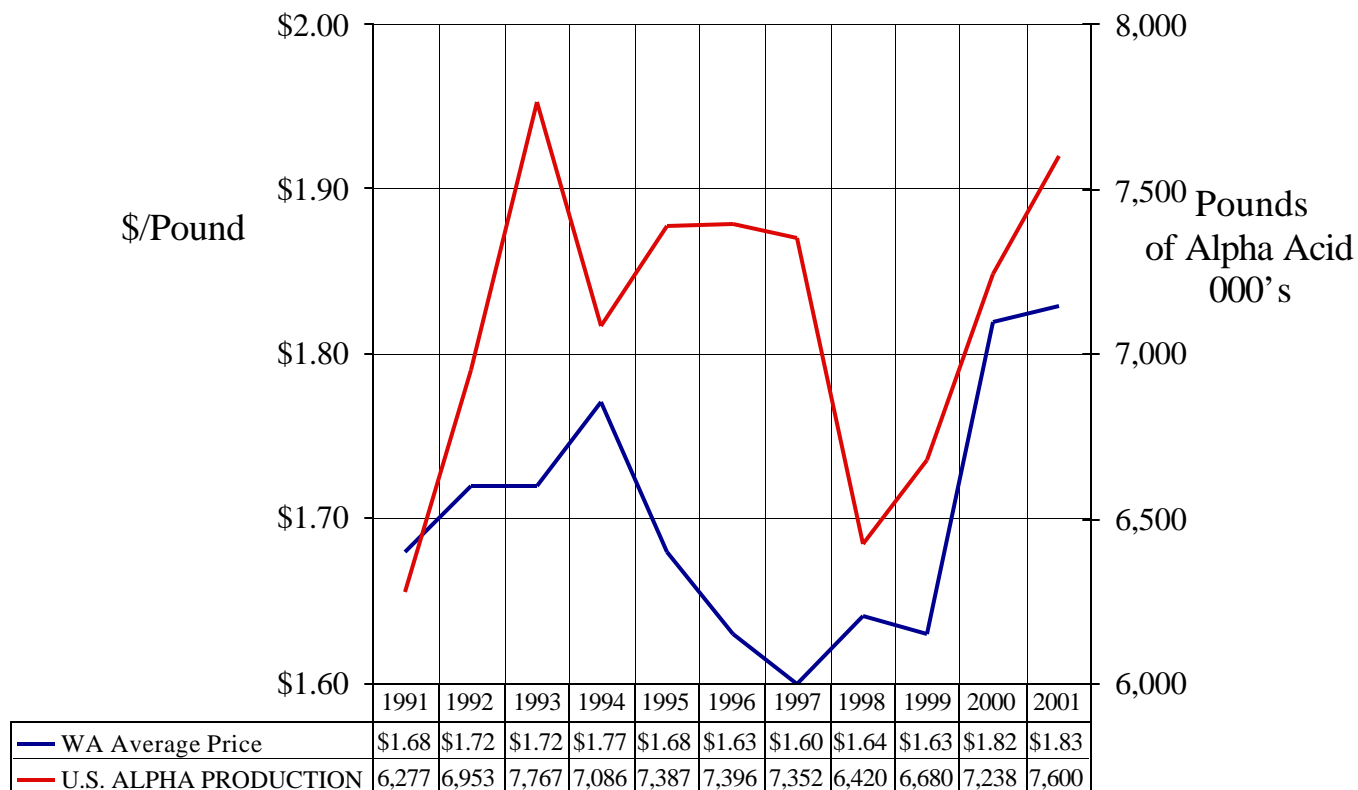
The primary goal of creating a Federal Marketing Order is to bring stability and structure to the hop industry. To do this, the hop industry must:

- (a) Accurately estimate the annual demand for alpha acid and alpha acid products on the world market and make adjustments that will bring supply in line with estimated demand to satisfy the market's needs,
- (b) Produce a sufficient supply of both alpha and aroma hops to meet the estimated demand for American hops and hop products,
- (c) Manage the release of any over production of alpha acid through a pooling arrangement,
- (d) Influence the ability of growers to preserve a continual and sustainable market in which the needs of the market may be consistently met.

### SIGNIFICANCE OF THE PROPOSAL

The proposed Federal Marketing Order will cause three fundamental changes in the hop industry. It will:

1. Stabilize the hop industry, ending the reactionary planting cycle in which some growers respond to a high price for hops by planting additional acres and respond to low prices by removing acreage. This cycle has continued since the termination of the previous marketing order with constant changes in production and price. The graph below represents the pounds of alpha acid produced and the average price per pound paid to Washington Growers for the past decade:

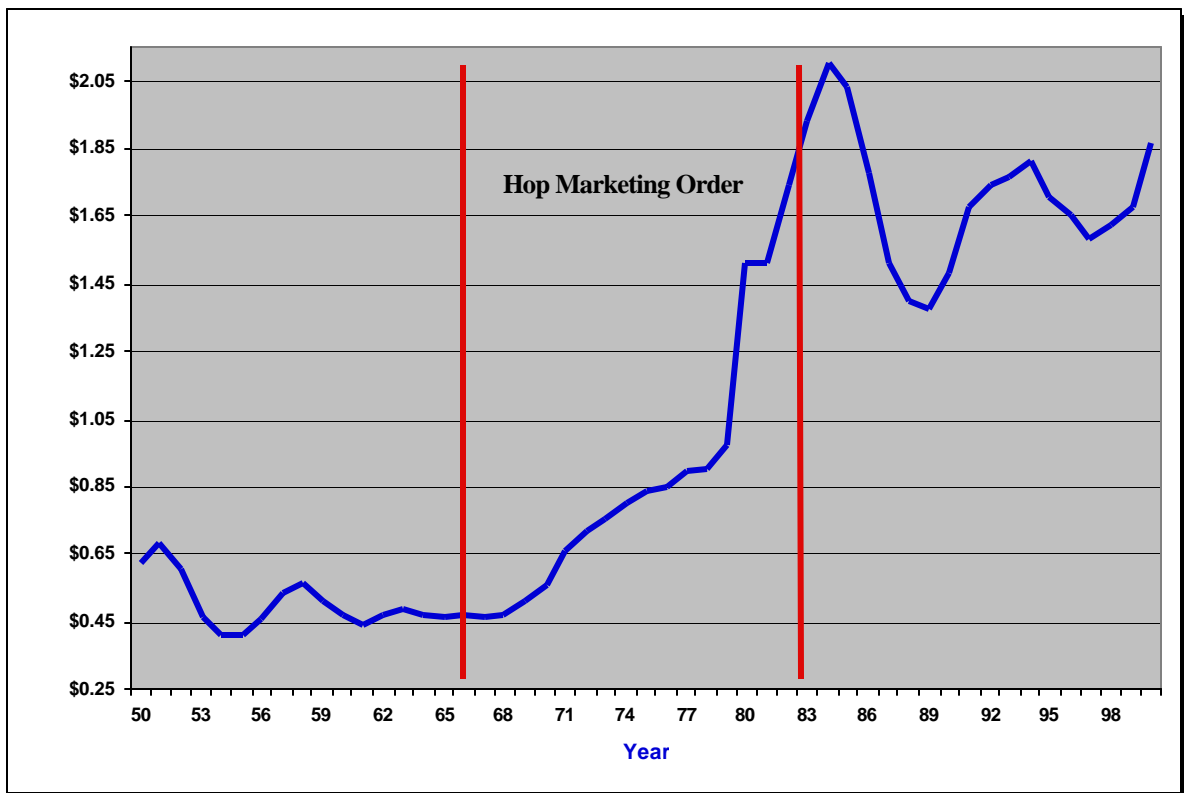


In the graph above, you can see effects of the “reactionary planting cycle” over the past ten years. The reactionary planting cycle is simply where growers react to a good market by planting additional hops and to a poor market by removing hops. The result, as evidenced by this chart, is great fluctuations in alpha production and therefore price from year to year leading to instability and unpredictability in the market.

Washington hop growers have the ability to plant a hop crop in the spring and receive respectable yields later that fall. The United States is the only country in the world that can make this claim. Without production management, this “swing” acreage is harmful to the industry because it enables the wild changes in production that we see above. With responsible production management, the Washington “swing” acreage can be a strong asset through which U.S. growers could respond to legitimate demand quickly.

The costs of production in Germany and the United States are such that the DM:USD exchange rate should be between 1.6 and 1.8 DM/USD for the U.S. to be competitively priced on the world market while still providing a return to the grower.

2. Stabilize the price received for hops at the farm to a more equitable level. *Example:* A commonly accepted cost of production figure used among growers is \$4,000 per acre. The 2001 average yield in the United States was 1,861 pounds per acre. Using 2001 average cost and average yields, the average farmer must receive \$2.15/lb. just to break even. The 2001 U.S. season average price was \$1.91/lb. This represents an average loss of \$0.24/lb. in 2001. Total 2001 production was 68.8 million pounds, representing a total loss of over \$16.5 million to the hop industry in 2001 alone! Using this same logic and based on the season average prices between 1996-2001 as listed in the Hop Growers of America statistical booklet and the 1999 Washington State University cost study figure of \$3900/acre as a cost of production, the U.S. hop industry has lost over **192.6 million** dollars during the past five years. The graph below demonstrates the changes in U.S. season average price over the past 52 years.



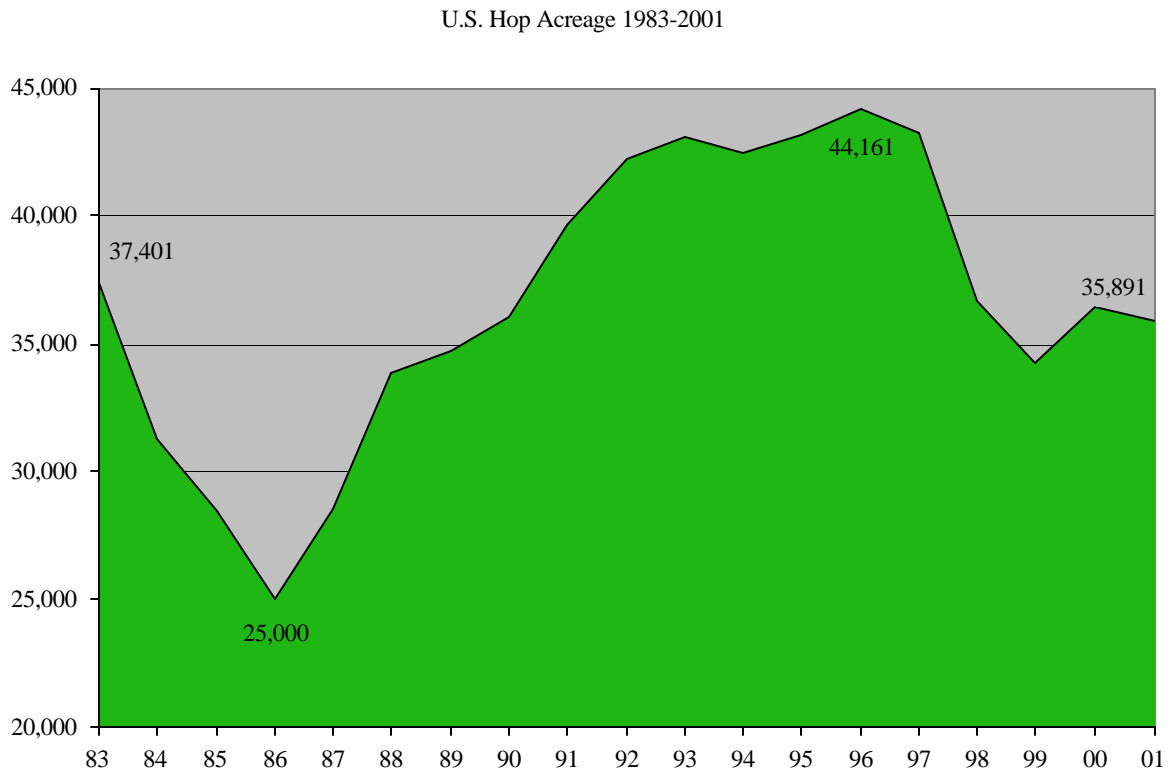
The U.S. season average price, includes both aroma and alpha varieties and contracted and spot/free hops sold between December 1 and November 30 of the following year.

In the graph above, you see the history of U.S. season average prices since 1950. In this graph, please notice the similarities between season average prices both before and after the marketing order. There is a marked difference in the trend of U.S. season average prices during the marketing order.

The marketing order itself cannot take the entire credit or blame for the 300 percent increase in season average price during its existence. Severe crop shortages in Europe in the final years of the marketing order contributed greatly to the drastic increase in season average price.

Prior to 1980, the trend of season average prices moved steadily upward allowing for gradually increasing expenses associated with inflation and other factors.

3. Manage the production of alpha acid from year to year so that acreage and production does not fluctuate wildly unless the market requires such fluctuation. The graph below demonstrates the fluctuation in acreage from 1983-2001.



Planting or removing hops is a costly process. Planting hops is generally thought to cost \$1,000 per acre and removing hops is generally thought to cost approximately \$500 per acre although costs vary depending upon the individual grower and his/her cultural practices.

Between 1983 and 2001, growers removed 20,671 acres and planted 19,161 acres in response to perceived market conditions. This does not count acres that remained in production on which varieties were changed, also a costly process. This demonstrates the inefficiency of the industry in properly measuring the needs of the market under the existing system.

Using the aforementioned figures, these over corrections cost the industry \$29.5 million over an 18-year period. This means that growers spend on average \$1.6 million per year trying to produce an adequate supply of hops to meet the demand of the market.

### ASSUMPTIONS AND LIMITATIONS

A Federal Marketing Order with marketing volume limitations would:

1. Provide stable and fair prices for merchants and end users,
2. Enable growers to measure and produce for the anticipated world demand for their product,
3. Set an annual saleable amount to satisfy anticipated world demand,
4. Influence the amount of hops produced each year by controlling the annual saleable available on the world market,
5. Enable existing inventories to make their way into the market through annual adjustments in the amount saleable,
6. Enable a grower to plant to accurately meet the needs of the market from year to year,
7. Enable a more stable price for growers from year to year without the highs and lows of the current market,
8. Enable a more equitable price for growers from year to year,
9. Increase grower efficiency as alpha acreage is converted to higher yielding varieties,
10. Provide an ample amount of aroma hops to satisfy the aroma market,
11. Insure that the needs of the market are met every year.

### COST OF THE PROGRAM:

The proposed Federal Marketing Order will not add significant cost to producers, handlers or the USDA. The U.S. hop industry currently has the infrastructure in place to administer an effective marketing order. Because of this, the incremental costs of administering a Federal Marketing Order and all that it will entail will be low.



“What is different *THIS* time?” The World Market

*The major differences:*

1966-1985	TODAY
Cluster variety hops at approximately 8% alpha and a stable 10 bales to the acre dominated the industry.	New super-alpha hop varieties enabling 14+ bales to the acre with alpha acids at 15% or higher.
Fewer and less dramatic swings in acreage from year to year.	Trend toward reduced acreage due to high efficiency varieties and less bitter beers.
Stability for the grower caused by 3-5 year forward contracts by brewers and merchants.	Increased risk for grower. Very few forward contracts. Most sales on a year-by-year basis.
Alpha acids available in hops in raw hop and pellet form which degrade over a relatively short period of time. Extracts not yet a significant component of the market.	Alpha acid extracts and further processed products available enabling prolonged storage of the product. The quality of the raw product after processing is not easily discernable.
Relatively diverse brewing industry with very few large brewing entities. Regional segregation	Rapid brewery consolidation. The 35 largest brewery groups control 2/3 of the world's beer production.
More than 10 merchants in the U.S. alone. More competitors for sales to brewers and purchases from growers.	Merchant oligopoly. Merchants, can if they choose, dictate the price of hops to growers. Sporadic market activity increases the likelihood that growers will take prices offered while available.
Relatively secure traditional production regions (i.e., United States & Europe, some activity in southern hemisphere).	Potential loss of alpha production base and market share to China & other Central European countries.
Cold war world with firm borders (i.e., USSR, Warsaw-pact countries, China).	Global economy offering easier trade and sourcing of goods and services worldwide.
Pre-Internet. Reliance on established channels of information for decision-making.	Internet, e-mail and increased communications among breweries and grower groups.

WHAT WOULD CHANGE UNDER THE PROPOSED FEDERAL MARKETING ORDER?

CURRENT PRACTICE	UNDER PROPOSED MARKETING ORDER
Farms may produce unlimited hop acreage and sell whatever is produced.	Hop acreage produced is not limited. The quantity of hops that may be sold is governed by a base allotment. Excess hops will go into an individual grower pool.
Hops produced in excess of demand are either stored or processed and held by growers.	Hops produced in excess of demand are entered into a pool, managed by the producing grower and used to satisfy the saleable allotment in subsequent years.
Everybody is left to discern the signals of the market and make decisions accordingly. Individual decisions may result in a net increase or decrease in acreage and production.	The Industry is producing for a common goal. Individual farms may increase or decrease their acreage within the boundaries of the established goals for any particular year but the total amount of product available for market is regulated to meet the needs of the market.

“What is different *THIS* time?” The Federal Marketing Order

*The major differences:*

PREVIOUS FEDERAL MARKETING ORDER 1966-1985	PROPOSED FEDERAL MARKETING ORDER 2003
Production of all hops regulated by pounds of hops produced.	Marketing of alpha acid regulated by pounds of alpha acid produced.
No opportunity for new growers to enter the industry.	Provisions for new base allotments in each year of expanding demand to both existing and new growers.
Base often sold, traded and leased without regard to the owner’s intent to produce.	Bona-fide effort clause that will require the owner of base to or that base will be lost.
One grower, multiple entities, multiple votes.	All farms run by a single decision making body (i.e., common banking, ownership, directorship, etc...) shall be entitled to only one vote.
Pool managed collectively by the committee.	Each grower’s individual pool is managed independently. Only the regulation of saleable for the entire industry will govern how much a grower may sell. That saleable may be filled through newly grown hops or pool hops at his/her discretion.

This document was prepared by  
Hop Growers of America  
On behalf of the  
Federal Marketing Order  
Proponent Committee  
Fall 2002